## Voluntary Corrective Action Plans Under Section 15 of the Consumer Product Safety Act and Section 15 of the Federal Hazardous Substances Act

| DATE  | FIRM AND PRODUCT                          | ALLEGED HAZARD          | REMEDY   |
|-------|---|-------------------------|--|
| 11/95 | RIVA SPORTS                               | EYE AND FACIAL INJURIES | Firm has attached warning  |
|       | SANDIEGO, CA 92160                        |                         | labels on all packages and on<br>the sling pouches warning of<br>"severe eye damage and facial |
|       | Riva Aqua Sling water balloon sling shots |                         | fractures, as balloons reach speeds of 75mph."   |



# Exchange Plus

Association of Trial Lawyers of America

1050 31st Street, N.W. Washington, D.C. 20007-0217 (800) 344-3023/(202) 965-3500

Fax: (202) 337-0977 e-mail: exchange@atlanet.org

Title: Water Balloon Sling Shots (General File)

Prepared For: CPSC, Esq.

Researched By: Brian W. Healey, Research Manager

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## **INQUIRERS**

Record Type:

Inquirer

ATLA Member:

BAILL, JEFFREY M

120 SIXTH STREET SOUTH, SUITE 2200

MINNEAPOLIS, MN 55402

Phone:

(000) 000-0000

Date:

05/31/95

Topic(s):

Toys - Miscellaneous

Abstract:

Plaintiff was playing with an Aqua Sling water balloon and suffered a

eye injury.

Comment:

P12

ATLA ID:

1333806

Record Type:

Inquirer

ATLA Member:

HOGLUND, JOHN A.

OLYMPIA, WA 98507

Phone:

(206) 786-1717

Date:

01/18/96

Age:

016 yr

Occupation:

Student

Topic(s):

Toys - Projectile Toys

Abstract:

Plaintiff was playing withy a Aqua Sling water balloon launcher,

when the rubber tubing came apart, whipped backed and hit plaintiff

in the eye.

Comment:

P12

ATLA ID:

1367156

Record Type:

Inquirer

ATLA Member:

DICKIESON, DAVID H

SILVESTEIN & MULLENS, #800, 1776 K STREET NW

WASHINGTON, DC 20006

Phone:

(202) 452-7975

Date:

04/07/95

Topic(s):

Toys - Miscellaneous

Abstract:

Plaintiff was struck in the eye with a water balloon causing permanent

vision impairment.

Comment:

P12

ATLA ID:

1325836

Record Type:

Inquirer

Page 1



ATLA Member:

GERASH, WALTER L.

Organization:

Gerash, Robinson & Miranda

GERASH ROBINSON & MIRANDA, P1439 COURT PLACE

DENVER, CO 80202

Phone:

(303) 825-5400

Date:

11/15/95

Age:

035

Topic(s):

Toys - Projectile Toys

Abstract:

Water Balloon Sling Shot. Injury due to being hit by water balloon

launched from a large sling shot.

Comment:

P15

ATLA ID:

1353166

Record Type:

Inquirer

ATLA Member:

WOCKEN, PAUL J

BOX 417, RED RIVER AVENUE & MAIN

COLD SPRING, MN 56320

Phone:

(612) 685-3678

Date:

10/03/94

Topic(s):

Toys - Miscellaneous

Abstract:

Plaintiff was injured from the use of a Aqual Sling manufactured by

Riva Sport.

Comment:

P12

ATLA ID:

1286846

Record Type:

Inquirer

ATLA Member:

HOWES, MARLIN E

Organization:

HORNBERGER & CRISWELL .

HORNBERGER & CRISWELL, 31ST FLOOR, 444 SOUTH

FLOWER STREET

LOS ANGELES, CA 90071

Phone:

(213) 488-1655

Date:

03/14/95

Age:

014 yr

Topic(s):

Toys - Water Toys Toys - Sling Shots

Abstract:

Aqua Cling Water Balloon Sling Shot manufactured by RIVA SPORT,

INC. of San Diego. Plaintiff lost an eye while playing with a water

sling shot.

Comment:

P11

ATLA ID:

1316736

Record Type:

Inquirer

ATLA Member:

MUHR, WILLIAM W



LAW FIRM OF WM MUHR & ASS, SEVENTH FLOOR, 111

SOUTH TEJON STREET

COLORADO SPRINGS, CO 80903

Phone:

(719) 473-7079

Date:

08/10/93

Topic(s):

Toys - Miscellaneous

Abstract:

Aqua Sling Water Balloon Sling Shot; Plaintiff was using the sling shot with two other individuals. While two individuals held the grips on both ends of the sling shot plaintiff's friend acted as the launcher positioned between and behind the holders. He inserted a potato into

the pouch, pulled back on the pouch and released it.

Comment:

P12

ATLA ID:

1209306

Record Type:

Inquirer

ATLA Member:

PHIFER, MICHEL LYNN

Organization:

Mithoff and Jacks

MITHOFF & JACKS, SUITE 3450, 500 DALLAS

HOUSTON, TX 77002

Phone:

(713) 654-1122

Date:

11/18/94

Age:

014 yr

Topic(s):

Toys - Projectile Toys

Abstract:

Water balloon launcher manufactured by Riva Sport, Inc.. 14 year

old plaintiff suffered blow-out fracture of left eye when struck by

balloon.

Comment:

P33

ATLA ID:

1304686

Record Type:

Inquirer

ATLA Member:

SLAVIK, DONALD H

Organization:

Habush, Habush and Davis

HABUSH HABUSH & DAVIS, 777 EAST WISCONSIN AVENUE

MILWAUKEE, WI 53202

Phone:

(414) 271-0900

Date:

01/22/93

Age:

051 yr

Topic(s):

Toys - Projectile Toys

Abstract:

Aquasling Water Balloon Sling Shot. Juveniles launching water

balloons using three person sling shot struck 51 year old woman in

face. Right eye damage.

Comment:

P33

ATLA ID:



Record Type:

Inquirer

ATLA Member:

FRASIER, JAMES E

Organization:

Frasier and Frasier

1700 SOUTHWEST BOULEVARD, SUITE 100, P O BOX 799

TULSA, OK 74101

Phone:

(918) 584-4724

Date:

09/07/90

Topic(s):

Toys - Projectile Toys

Abstract:

Aqua Sling Water Balloon Sling Shot. Aqua Sling had been attached to two wooden posts and plaintiff and friend were using rocks instead of balloons. As plaintiff drew back on sling with a rock in the pouch. the pouch went forward and came back, striking plaintiff in mouth.

Broken and crushed jaw; loss of three teeth.

Comment:

PDA

ATLA ID:

0990136

Record Type:

Inquirer

ATLA Member:

KOORY, FRANKLIN

3155 WEST BIG BEAVER ROAD, SUITE 100

TROY, MI 48084

Phone:

(313) 649-3240

Date:

06/28/90

Occupation:

College Student

Topic(s):

Projectile Toys

Toys

Abstract:

Case involves eye injuries as a result of being struck by a water

balloon launched by a Winger brand water balloon slingshot

manufactured by Winger Sports, Ltd.

Comment:

P34

ATLA ID:

0977026

Record Type:

Inquirer

ATLA Member:

BERGER, CHARLES L

BERGER & BERGER, 313 MAIN STREET

EVANSVILLE, IN 47708

Phone:

(812) 425-8101

Date:

01/10/94 .

Topic(s):

Toys - Miscellaneous

Abstract:

Plaintiff sustained facial injuries when an unknown person fired a

water balloon into a crowd with an AQUA SLING. The sling is

manufactured by Riva Sports, Inc.

Comment:

P12

ATLA ID:



Record Type:

Inquirer

ATLA Member:

ROBERTS, RANDELL C

ROBERTS & ROBERTS, 118 WEST FOURTH STREET

TYLER, TX 75701

Phone:

(903) 597-6655

Date:

05/04/94

Age:

018 yr

Occupation:

Student

Topic(s):

Projectile Toys

Abstract:

RIVA SPORTS, AQUA SLING Water Balloon Slingshot. Water

balloon launched from slingshot struck plaintiff in eyes. Injuries to

eyes.

Comment:

P15

ATLA ID:

1254976

Record Type:

Inquirer

ATLA Member:

FUJIMOTO, WARD F N

Organization:

Fujiyama, Duffy and Fujiyama

SUITE 2700, PAUAHI TOWER, BISHOP SQUARE

HONOLULU, HI 96813

Phone:

(808) 536-0802

Date:

12/28/94

Age:

015 yr student

Occupation: Topic(s):

Toys - Miscellaneous

Abstract:

Water Sports of Florida Model Ws-200 water balloon launcher. 15 year old male was at a beach park when he was struck in the face by

a water balloon propelled by launcher. Blindness in left eye; 50

vision in right eye.

Comment:

P33

ATLA ID:

1302296

Record Type:

Inquirer

ATLA Member:

MACIEJEWSKI, DONALD

SPOHRER & WILNER P A, 444 EAST DUVAL STREET

JACKSONVILLE, FL 32202

Phone:

(904) 354-8310

Date:

09/08/94

Age:

014 yr

Topic(s):

Toys - Miscellaneous

Abstract:

A large slingshot made with surgical tubing and sold as a toy caused

injuries to plaintiff. Plaintiff was using a Master Blaster with the aid of two other boys to launch a water balloon. The tubing split and

snapped back and put plaintiff's eye.

Comment:

P12



ATLA ID:



## **REFERENCES**

Record Type:

Inquirer

ATLA Member:

THOMAS, CLARENCE M

TEN CHURCH LANE,

BALTIMORE, MD 21208

Phone:

(301) 484-0300

Date:

08/15/89

Age:

035 yr

Topic(s):

Toys - Projectile Toys

Abstract:

APYC Big Shot projectile adult toy. Shoots large water balloon from

attachment with metal hook. 35 year old woman was attempting to launch projectile when point of attachment came untied and metal

snap struck her hand. Multiple fractures of hand.

Comment:

P33

ATLA ID:

PSA ACTION (FOR PSA USE ONLT)

| (8500) 40/9 veg)       | Hazard:  |
|------------------------|--|
|                        | 101 1011 ME155 Comments NE155 Estimates Deaths NF1R5   |
|                        | 2013U 24150A 2015mit23 2213U 2109mmc7 2213W [10]   |
|                        | EPI ASSESSMENT: Dates: From TO Sort by Mfg. Yes No   |
| ( )                    | solf andle troks   |
| Ċ.                     | germits.) Verbal report on velocity measurements ASAI  |
|                        | for Lips on testings (Try smaller ballons if time  |
|                        | velocity using photoelectric screens, Call Ron Leiche  |
| AN                     | weigh, make a least 10 Thals to meusure average  |
|                        | EVALUATION REQUESTED: FILL ballons about the size of tennis balls                                      |
|                        | Sample Disposition: Return to Requestor Store at Whse Other:   |
|                        | Sample number: 7-793-0463  |
| ed. Summary:           | Brand name, model, etc.  |
| .0.1                   | ''   |
| 9-1 :nolloxinegat      |  |
| sol bangiasi           | PRODUCT INFORMATION  |
|                        | Date: June 12, 1895 Priority: AD Case#   |
| - 25/5//3 :aled end    | Requested by: T. Kennedy Org. Codes: CECA FO_R   |
| ate Reduested:         | PRODUCT SAFETY ASSESSMENT (PSA) TECHNICAL EVALUATION REQUEST  Note: Print, use black pen, no blue ink, |
| 30/ Z//9 :bessed:      |  |
| SEGO : 190mp ; sedocat | ***** OFFICIAL USE CHLYAMA   |

Attachments:

Requested date:

## FOR OFFICIAL USE ONLY

Kronuguph = Photo electric screens (2)
Measure in micro-peconte

**PSA 0638** 

6-13-95

FROM: ROBERT HUNDEMER; LS

TO: J. KENNEDY; CECA

SUBJECT: SPEED MEASUREMENTS OF WATER BALLOONS.

## SHORT GREEN DEVICE

| WEIGHT IN GRAMS | PULL DISTANCE | FEET PER SEC. |  |
|-----------------|---------------|---------------|--|
|                 |               |               |  |
| 1 239           | 30 INCHES     | 68            |  |
| 2 213           | 30 INCHES     | 68            |  |
| 3 203           | 30 INCHES     | 76            |  |
| 4 250           | 30 INCHES     | 61            |  |
| 5 259           | 30 INCHES     | 66            |  |
| 6 307           | 30 INCHES     | 59            |  |
| 7 279           | 41 INCHES     | 81            |  |
| 8 260           | 41 INCHES:3#  | 5in 80        |  |

=55 mph

### **LONG ORANGE DEVICE**

| WEIGHT IN GRAMS | PULL DISTANCE            | FEET PER SEC. |  |
|-----------------|--------------------------|---------------|--|
|                 |                          |               |  |
| 1 252           | 42 INCHES                | 70            |  |
| 2 179           | 42 INCHES                | 83            |  |
| 3 200           | 42 INCHES                | 77            |  |
| 4 167           | 42 INCHES                | 83            |  |
| 5 327           | 42 INCHES                | 73            |  |
| 6 298           | 42 INCHES                | 62            |  |
| <b>7</b> 270    | 42 INCHES                | 72            |  |
| 8 370           | 42 INCHES=3ft 6ii        | 73            |  |
| 9 288           | 60 INCHES = <b>5</b> + † | 109           |  |

50 mph

= 74 3 mph

\* Directions call for 6H maximum extension.

## TOR OFFICIAL USE ONLY

PSA 0638

6-13-95

FROM: ROBERT HUNDEMER; LS

TO: J. KENNEDY; CECA

SUBJECT: SPEED MEASUREMENTS OF WATER BALLOONS.

## SHORT GREEN DEVICE

| WEIGHT IN GRAMS | RAMS PULL DISTANCE FEET PER SE |      |  |  |
|-----------------|--------------------------------|------|--|--|
|                 |                                |      |  |  |
| 1 239           | 30 INCHES                      | 68   |  |  |
| 2 213           | 30 INCHES                      | 68   |  |  |
| 3 203           | 30 INCHES                      | 76   |  |  |
| 4 250           | 30 INCHES                      | 61   |  |  |
| 5 259           | 30 INCHES                      | 66   |  |  |
| 6 307           | 30 INCHES                      | 59 • |  |  |
| 7 279           | 41 INCHES                      | 81   |  |  |
| 8 260           | 41 INCHES                      | 80   |  |  |

## LONG ORANGE DEVICE

| WEIGHT IN GRAMS | PULL DISTANCE FEET PER SEC. |     |  |  |
|-----------------|-----------------------------|-----|--|--|
|                 |                             |     |  |  |
| 1 252           | 42 INCHES                   | 70  |  |  |
| 2 179           | 42 INCHES                   | 83  |  |  |
| 3 200           | 42 INCHES                   | 77  |  |  |
| 4 167           | 42 INCHES                   | 83  |  |  |
| 5 327           | 42 INCHES                   | 73  |  |  |
| 6 298           | 42 INCHES                   | 62  |  |  |
| 7 270           | 42 INCHES                   | 72  |  |  |
| 8 370           | 42 INCHES                   | 73  |  |  |
| 9 288           | 60 INCHES                   | 109 |  |  |

| 7 | 9 |
|---|---|
| _ |   |

|     |   |  |             |              | · 2 triamd     | 26114                   |              | 29\20\2 .atsb batzaupag  |
|-----|---|--|-------------|--------------|----------------|-------------------------|--------------|--------------------------|
|     |   |  |             |              |                |                         |              |                          |
|     |   |  |             |              |                |                         |              | Hazard: eye injury       |
| . • |   |  |             | NEIBS        | ed1690         | serimetes estimates     | :InemmoD 221 | 101 101 ME               |
|     |   | e de la companya de l |             |              | c              | Sort by Mfg. YesN       | i<br>-       | -ol ASSESSMENT: Dates:   |
|     |   | . <del></del>  |             |              |                |                         |              |                          |
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|     |   |  | Py001 ,by05 | , e.g. 30yd, | esonetaib lene | ves mont sonot tosqui   | 1291 -       |                          |
|     | *                                       |  | Hanna       |              |                | . Launch velocities.    | isəi - 23    | VALUATION REQUESTED:     |
|     |   | ·  | *********** | : Ja         | мрге отре      | Requestor Store at      | ot mnuteA_   | Sample Disposition: X    |
|     |   | Red. Summary:  | •           |              |                | (by005 \$ 00f) S        | & f due Ei   | 50-567-1 :19dmun 91gms   |
|     | *************************************** | :.0.1  |             |              |                |                         | todspoil     | Product: water balloon s |
|     |   |  |             |              |                | AJ ,ogsid nes :stats    | :            | anufacturer: Riva Sport  |
| 5   | 300                                     | Organization:  |             |              |                | •                       |              | MOLTANGONI TOUGOS        |
| , J |   | :of bangissA   |             | <b>70</b>    | C826# FW9500   | A:Y3inoin9              |              | \$6/5Z/Z :ale            |
|     | (10                                     | . sted sud   |             |              |                | AD3D :sebo              | og falg kp   | ednested by: Jean Kenne  |
|     | <u> </u>                                | .:bateaupes ated   |             |              |                | ink.                    | beu' uo pin  | lote: Print, use black   |
|     | -62/7                                   | _ ibeseason4 esed  |             |              | 12:            | HNICAL EVALUATION REQUE | )31 (A29) TI | RODUCT SAFETY ASSESSMEN  |
|     | 19/0                                    | Rednest number:  | -           |              |                | TAL USE ONLY***         | **FOR OFFIC  | **                       |
| •   | SA USE DALY)                            | PSA ACTION (FOR F  |             |              |                |                         |              |                          |

| Dord  | PSA ACTION (FOR PSA USE ONLY) |          |
|---|-------------------------------|----------|
| **** FOR OFFICIAL USE ONLY****  | Request number:               | -        |
| PRODUCT SAFETY ASSESSMENT (PSA) TECHNICAL EVALUATION REQUEST                          | Date Processed: 2/2)          | -        |
| Note: Print, use black pen, no blue ink.  | Date Requested:               |          |
| Requested by: Jean Kennedy Org. Codes: CECA FOWR                                      | Due Date:                     | -        |
| Date: _2/24/95 Priority:A   |                               |          |
| PRODUCT INFORMATION   | Assigned to:                  | [ [ = EA |
|   | Organization:                 |          |
| Manufacturer: Riva Sport State: San Diego, CA   | T.O.:                         |          |
| Product: water balloon slingshot  |                               | -        |
| Sample number: T-793-0353 Sub 1 & 2 (100 & 200yd)                                     | Req. Summary:                 | -        |
| Sample Disposition: X_Return to RequestorStore at WhseOther:                          |                               | <b>*</b> |
| EVALUATION REQUESTED: Es - test launch velocities. for various weight projectiles at  |                               | <u>.</u> |
| Ears Siferent distances - Test Impact forms several distances, e.g. 30yd, 50yd, 100yd | 2-28-95                       | -        |
| (See Pon Reichel & Mike Giddings for formulation of test                              | 2-60                          |          |
| Plan)   | · All                         |          |
|   |                               |          |
| EPI ASSESSMENT: Dates: Sort by MfgYesNo   |                               |          |
| ID1IP11NEISS CommentsNEISS EstimatesDeathsNFIRS                                       | ł                             | •        |
| Hazard: eye injury  |                               |          |
|   |                               |          |
| Requested date: 3/03/95   |                               |          |

# United States Consumer Product Safety Commission Washington, D.C. 20207

#### **MEMORANDUM**

Date: April 5, 1995

To

Jean Kennedy, Division of Corrective Actions

Through:

Marc Schoem, Director, Division of Corrective

Actions

James F. Hoebel, Acting Director, Fishelus

Division of Mechanical Engineering

From:

Roy W. Deppa, Division of Mechanical Engineering

Phone 301:504-0494 Ext. 1306

Subject: PSA 0168, RP950004, Riva Sport Water Balloon

Slingshot

Ref:

Sample Number T-793-0353

Request: Test launch velocities for various weight projectiles at two different distances, Determine energy at several distances, e.g. 30yd, 50yd, 100yd.

Discussion: The product is a type of slingshot designed to launch a water-filled balloon. The package contains the slingshot device, a bag of balloons, a nozzle for attachment to a hose bibb for filling the balloons, and a piece of red vinyl sheet approximately 23 cm square that is intended as a target. The slingshot is intended to be used by three people; one to pull back the pouch, aim and release the water balloon, the other two to hold the two ends of the device.

The file includes reports of incidents in which people were struck by the water ballon. Some of these incidents resulted in injury.

Two samples were provided, labeled by the manufacturer as "Recreation Model 100 YD Range" and "Competition Model, 200 YD Range". The significant difference between these two models is in the length of tubing.

As discussed previously, this assessment was limited to a small informal demonstration and analysis. The devices perform adequately, allowing reasonable aim to be achieved, and there appear to be no obvious deficiencies in construction. The labeling is inaccurate, however, as it is not possible under normal conditions to achieve anywhere near the 200 YD (approx. 185 meters) range claimed for the larger unit. Furthermore, the instructions state "Never stretch tubing more than six (6) feet when launching balloons." When stretched that distance, the longer device will launch a balloon approximately 30 meters. The device may be stretched

considerably farther than two meters. When stretched about four meters, however, the water balloon generally breaks on release. The shorter device may not be stretched as far, but when stretched very tightly at about 1.5 meters, it will launch a balloon about 40 meters, again far short of the claimed range.

At launch, the velocity of the water balloon is around 20 m/sec. Thus, the energy at launch of a balloon holding the recommended amount of water ("size of tennis balls") would be in the range of 25-30 joules.

Conclusion: ES does not believe the product contains a deficiency in either design or construction that presents an unexpected hazard. The energy at launch of a balloon filled according to instructions is about equal to that of a baseball thrown in youth leagues. (This comparison is not useful in visualizing impact, however, as the impact characteristics of baseballs and water balloons are not similar.) The manufacturer's claimed ranges for the two samples are not realistic. ES recommends no further technical activity.

#### UNITED STATES GOVERNMENT

#### MEMORANDUM

U.S. CONSUMER PRODUCT SAFETY COMMISSION WASHINGTON, D.C. 20207 OCT 30 1989

TO : Terri Rogers, CARM

THROUGH: Frank Brauer, Project Manager, PSA Team

Andrew G. Ulsamer, Ph.D., AED, HS AGO Marilyn L. Wind, Ph.D., Director, HSPS macu

FROM: Robert G. Hazard, M.D., HSPS 7 14 17.

SUBJECT: Response to PSA Request No. 4743

Request:

The subject PSA requests HS to review injuries reported to CPSC caused by use of water balloon slingshots.

#### Background:

This product is a sling composed of surgical rubber tubing usually requiring three persons to operate and is used to launch water filled balloons at a velocity in excess of 200 feet/second at a range exceeding 100 yards.

#### Discussion:

There have been four injuries reported to CPSC caused by use of water balloon slingshots. Two of these injuries involved the face or eyes of the victim, one was reported to have caused a severe bruise, and one injury to the chest presumably caused a cardiac arrest. There is also one reported injury from a water balloon hurled from a rapidly moving car.

A 10 year old boy was struck by a water balloon below the left eye causing a fracture of the left eye orbit or bony socket of the eye (IDI 881007WES4003). This type of injury may occur when the force of a blunt object is exerted upon the orbit of the eye causing compression of the eyeball. There is expansion of the eyeball perpendicular to the direction of impact and this transmitted force can result in a "blowout" fracture of the orbital floor and medial wall. This type of fracture requires surgery to repair. In addition, in this particular case there was injury to the retina caused by the same transmitted force causing a partial loss of visual acuity in the left eye with a possible permanent partial vision loss.

## FOR OFFICIAL USE ONLY

#### Page 2

Another injury involved a 24 year old male who was struck in the right eye by a water balloon while a spectator at a football game. The water balloon and launching sling were apparently homemade. The balloon presumably traveled 1,000 yards. Although this injury was similar to the one described above, it is difficult to relate it to this product because we do not know what the characteristics of this launching sling were. The injured man sustained a right sided optic neuropathy and a hole in the macula of the retina which has limited vision to 20/200 in the right eye. This victim also sustained an orbital blowout fracture which required surgery.

Another eye injury reported was sustained by a 16 year old male who was struck in the right eye by a water balloon. At the time of injury he was apparently riding on the hood of a car traveling approximately 60 miles per hour. He was struck in the face by a water balloon hurled from an oncoming car traveling approximately the same speed. This victim also sustained an orbital blowout fracture requiring a surgical repair and has subsequently made an uneventful recovery. Although this is similar to the first injury discussed it was not the result of a water balloon shot by a slingshot. However, it should be considered analogous because of the speed imparted to the balloon by the closing velocities of the two cars.

Two other injuries have been reported to CPSC but no medical records are available for review. A severe contusion (bruise) of the thigh was sustained by a 34 year old female passenger on a sailboat who was struck by a water balloon launched from a dock (IDI 890625WES4006). There is also a reported injury of a 9 year old male who was struck in the chest by a water balloon and although sustaining a loss of consciousness and cardiac arrest made an uneventful recovery (IDI 890925WES4006).

#### Conclusion:

Of the reported injuries that have been caused by water balloons which are documented by medical records, eye and facial injuries are the most serious. Injuries to other parts of the body would likely result in superficial injuries such as bruises with no permanent disability. A direct impact by a water balloon to the thorax or abdomen could result in serious injury. Cardiac arrest has been reported. Children could be at particular risk for this type of injury. Injuries caused by impact to the face and eye have caused documented severe injury requiring hospitalization and surgery. In two of the reported cases this type of injury has caused lifelong disability including partial loss of vision.

Jean,

My demonstration yielded a mori mum range of approx. 250 ft, using the layer device. The initial velocity would have been approx. 65 miles/fr.

Roy (Deppa, ES)

| ****FOR OFFICIAL USE ONLY****  |
|--|
| PRODUCT SAFETY ASSESSMENT (PSA) TECHNICAL EVALUATION REQUEST Note: Print, use black pen, no blue ink.  |
| Requested by: Jean Kennedy Org. Codes: CECA FOWR   |
| Date: _2/24/95 Priority:A  |
| PRODUCT INFORMATION  |
| Manufacturer: Riva Sport State: San Diego, CA  |
| Product: water balloon slingshot   |
| Sample number: T-793-0353 Sub 1 & 2 (100 & 200yd)  |
| Sample Disposition: X_Return to RequestorStore at WhseOther:   |
| EVALUATION REQUESTED: Es - test launch velocities. for various weight papechles at  Defermine Energy at  Low different distances - test impact forms several distances, e.g. 30yd, 50yd, 100yd |
|  |
| (See Ron Reichel & Mike Giddings for formulation of test   |
| Plun)  |
| EPI ASSESSMENT: Dates: Sort by MfgYesNo  |
| IDIIPIINEISS CommentsNEISS EstimatesDeathsNFIRS  |
| Hazard: eye injury   |
|  |

Attachments:

Requested date: 3/03/95\_\_\_\_

| PSA ACTION (FOR PSA USE ONLY) |       |
|-------------------------------|-------|
| Request number:               |       |
| Date Processed: 2/27          |       |
| Date Requested:               |       |
| Due Date:                     |       |
| Assigned to:                  |       |
| Organization:                 | ES-EG |
| 1.0.:                         |       |
| Req. Summary:                 |       |
|                               |       |
|                               | /     |
| 28-95                         | •     |
| 2-28-95<br>44)                |       |
| γwo                           |       |

(Rev 6/94 fppsa)

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|--|----------------------|----|
| ****FOR DFFICIAL USE ONLY****  | Request number: Q984 | // |
| PRODUCT SAFETY ASSESSMENT (PSA) TECHNICAL EVALUATION REQUEST Note: Print, use black pen, no blue ink.  | Date Processed:      | •  |
| Requested by: Jean Kennedy Org. Codes: CECA FOWR   |                      |    |
| Date: 1/19/95Priority: B Case# FW950004  |                      |    |
| UCT INFORMATION  | Assigned to:         |    |
| Manufacturer:Riva Sport (and others) State: CA   | Organization:        |    |
| Product: Aqua Sling - a water balloon launcher (toy?)  | 1.0.:                |    |
| (there will possibly be other manuf samples which are basically the same)  | Req. Summary:        |    |
| Sample number:   |                      |    |
| Sample Disposition: _xxReturn to RequestorStore at WhseOther:  |                      |    |
| EVALUATION REQUESTED: HF:1.Evaluate likely ages of users.  |                      |    |
| <ol> <li>Evaluate likely type of play by those users.</li> <li>Evaluate perception of risk of injury by those users.</li> </ol>  |                      |    |
| 4.Evaluate present label information to direct type of play. 5.Evaluate label effectiveness to address perception of water-filled balloons as  |                      |    |
| 6.Suggest label that would change perception of water-filled balloons as causing serious injury and also to not use to water-soak people.  |                      |    |
| EPI ASSESSMENT: Dates: From TO Sort by Mfg. Yes No   |                      |    |
| IDIIPIINEISS CommentsNEISS EstimatesDeathsNFIRS  |                      |    |
| Hazard: eye injury, i.e. retinal tears, hemorrage, cut iris, orbital fracture or "blowout" $\mathcal{A}^{\mathbb{Q}}$ Requested date: February &, 1995   | (Rev 6/94 fppsa)     |    |
| Is, I can provide those. Perhaps this is a reference source answer.  | -                    |    |
| Comment of the state of the second of the se | il such              |    |



U.S. CONSUMER PRODUCT SAFETY COMMISSION

# FOR OFFICIAL USE ONLY

CPSC FORM 183 (4/92)



# United States CONSUMER PRODUCT SAFETY COMMISSION Washington, D.C. 20207

**EMORANDUM** 

DATE:

FEB 23 1985

TO

Jean Kennedy, CECA

Through:

Dr. Robert D. Verhalen, Associate Executive Director

Directorate for Epidemiology

FROM:

George Sweet, EPHF, 504-0468 (x1283)

SUBJECT:

PSA # 9984; Riva Sport Aqua Sling

## Request

The Office of Compliance and Enforcement asked the Division of Human Factors to complete the following tasks: 1) evaluate likely ages of users, 2) evaluate likely type of play by those users, 3) evaluate perception of risk of injury by those users, 4) evaluate present label information to direct type of play, 5) evaluate label effectiveness to address perception of water-filled balloons as causing serious injury, and 6) suggest label that would change perception of water-filled balloons as causing serious injury and also to not use to water-soak people.

### Background

The subject product is a large sling-shot water balloon launcher. It consists of three main parts.

• Two 4-inch-long foam handles at each end.

• Rubber tubing extending from handle to handle (approximately 66 inches or 1/2 feet long when not stretched). The circumference of the tubing is approximately 1 1/4 inches.

A 7 1/4 inch square pouch that has a strap attached to the back of it.

Additionally, a 9-inch square plastic target is included with the product. The front of the package states For ages 21 and over and in small print (capital letters are approximately 1/16 inches high) a warning on proper use and balloon choking hazard. The warning on proper use is as follows:

V